

***NATIONAL WEATHER SERVICE INSTRUCTION 10-1003  
FEBRUARY 6, 2003***

***Operations and Services  
Climate Services, NWSPD 10-10  
CLIMATE DATA SERVICES***

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**NOTICE:** This publication is available at: <http://www.nws.noaa.gov/directives/>

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**OPR:** OS4 (M. Berger)

**Certified by:** OS4 (R. Livezey)

**Type of Issuance:** Emergency

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***SUMMARY OF REVISIONS:*** This directive supersedes National Weather Service Instruction 10-1003, dated September 30, 2002; Weather Service Operation Manual (WSOM) Chapter F-22 (Local Climatological Data, Preliminary and Annual Summary), Issuance 83-11, dated May 20, 1983; and Operational Manual Letter 4-93 (filed with WSOM Chapter F-22), dated April 29, 1993.

This issuance has an additional requirement in section 2.2, as summarized below:

WFOs will post, on their web sites, Preliminary Local Climatological Data form (F-6) for Local Climate Data (LCD) stations for which the AWIPS CLIMATE program produces Daily (CLI) and Monthly (CLM) Climatological Reports.

All other information in this instruction remains unchanged.

(signed) \_\_\_\_\_ January 23, 2003

Gregory A. Mandt Date

Director, Office of Climate,  
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1. Introduction. This instruction describes how Weather Forecast Offices (WFO) should respond to public requests for climate data. Climate data includes observational data and long term means, extremes, and other statistics from surface in situ sites. This includes NWS Automated Surface Observing Station sites and NWS cooperative observation sites. There are two data categories of data:

- “Official” data formally published by the National Climate Data Center (NCDC) and subject to NCDC quality control.
- “Unofficial” data distributed by WFOs but not subject to NCDC quality control.

2. Observational and Daily Climate Data.

2.1 Definitions. Observational and daily climate data include the observations and/or totals of the following elements for either an hour, day, month, season, year, and/or other time period, as appropriate.

high temperature  
low temperature  
average temperature  
heating degree days  
cooling degree days  
precipitation  
snowfall  
snow depth  
departures from normal for any of the above  
the average wind speed in miles per hour  
the fastest 2 minute wind speed (in miles per hour)  
the average direction of the wind speed, using 360 degrees of a compass.  
the highest wind gust for the day (in miles per hour)  
the direction of the day's peak wind gust.  
weather type observed  
narrative summaries of any of the above

2.2. Availability from WFOs. WFOs may receive and respond to data requests from multiple sources (e.g. the Internet [web], e-mail, fax, telephone, hard copy [by mail or visit], etc.), Unless referral to NCDC is warranted according to section 4, WFO data availability will be subject to the following conditions:

- WFOs will indicate their data is “unofficial” and mention NCDC as the official source of data. WFOs will provide a link to NCDC on their climate data web pages.

- WFOs will not provide NCDC publications of official data (e.g. NCDC Local Climatological Data forms) by any medium since NCDC recovers their official data costs from user fees.
- WFOs will post, on their web sites, Preliminary Local Climatological Data form (F-6) for Local Climate Data (LCD) stations for which the AWIPS CLIMATE program produces Daily (CLI) and Monthly (CLM) Climatological Reports. WFO will use the standard F-6 format produced by the AWIPS CLIMATE program. The F-6 data is for use by the NCDC and the public. WFOs will, at a minimum, post the F-6 data for the entire preceding month no later than the 5th day of the following month. WFOs may post the F-6 data more frequently (i.e., current month to date). The web page containing the F-6 data will include a disclaimer stating that the data is "unofficial"; a note stating that NCDC is the official source of climate data; and the name, e-mail address, and telephone number of a point of contact for questions relating to the F-6 data. WFOs will perform a quality control check of the F-6 data before posting and make the F-6 web page easily available through a minimum of web links. See Instruction 10-501 (WFO Statements, Summaries, Tables Products Specification) for further details.
- In addition to the F-6 requirement, WFOs may provide free access to unofficial climatological data for any stations within their area of responsibility without any time restrictions into the past and without restrictions on methods of distribution.
- For unofficial U.S. data outside a WFO's area of responsibility, WFOs will limit Internet (web) access to climate data to the three (3) full months in the immediate past plus the current month. This time restriction does not apply to other ways of distribution (e.g. e-mail, fax, telephone, hard copy [by mail or visit], etc). The web limitations reduce the potential of conflicting information. A WFO should refer users of unofficial data to other WFOs as appropriate.

3. Long Term Climate Means, Extremes, and other Statistics.

3.1 Definitions. This data includes calculations for any data element in section 2.1 in accordance with the following definitions:

Period of Record: the full length of a station's records from beginning of observations to present.

Period Mean: a mean computed for any period of at least 10 years starting on January 1 of a year ending with the digit 1.

Record Mean: the mean for the station's period of record, without regard to changes in a station's location.

Adjusted Record Mean: the mean for the station's period of record, after adjusting the data for changes in station location.

Normal: a period mean computed from a relatively long period comprising at least three consecutive 10-year periods. NWS practice is to have these three consecutive 10-year periods end in a decadal year (for example, 1971-2000).

Climatological Standard Normal: the mean computed for one of a series of non-overlapping 30 year periods.

Climate Prediction Center (CPC) base period means: 30 year mean for outlook valid times used by CPC as reference in their climate outlooks.

Extremes: Highest and lowest observational data values for a day, month, season, year, all time, earliest, latest, etc. for the observing station's period of record.

3.2. Availability from WFOs. WFOs may receive and respond to data requests from multiple sources (e.g. the Internet [web], e-mail, fax, telephone, hard copy [by mail or visit], etc). Unless referral to NCDC is warranted according to section 4, a WFO may make any of the information above available subject to the following conditions:

- WFOs will indicate their data as unofficial and mention NCDC as the official source of data (except for CPC base period means). WFOs will provide a link to NCDC on their climate data web pages
- WFOs will not provide official NCDC publications by either hard copy, fax, or Internet (web). Examples of restricted NCDC publications of official records include:
  - CLIM No. 81: Monthly Normals of Temperature, Precipitation, and Heating and Cooling Degree Days, 1971-2000.
  - CLIM No. 84: Daily Normals of Temperature, Precipitation, and Heating and Cooling Degree Days, 1971-2000.
  - CLIM No. 85: Divisional Normals and Standard Deviations of Temperature, Precipitation, and Heating and Cooling Degree Days, 1931-2000 (Divisions refer to state climatic divisions as defined by NESDIS). Normals periods include 1931-1960, 1941-1970, 1951-1980, 1961-1990, and 1971-2000, as well as the long-term mean for 1931-2000.
- WFOs may provide unofficial long term climate means, extremes, and other statistics (including normals) on the Internet (web) for their area of responsibility.

- For others methods of conveyance (e-mail, fax, telephone, hard copy [by mail or visit], etc), WFOs may provide non-restricted U.S. information outside their area of responsibility.
4. Referral of Requests.
- a. WFOs will refer requests to NCDC for the following situations:
    - Any request requiring certification of data.
    - Any request related to a requirement to fulfill a law, mandate, or ordinance for a federal, state, or local government authority.
    - Any international climate requests.
  - b. WFOs should refer requests for the following situations to NCDC, the Regional Climate Centers, or the NWS web link listing commercial weather vendors serving the U.S, as appropriate:
    - When a request requires data in a format different from what is available to the WFO.
    - When a request would require a WFO to expend extensive time and effort to answer.
    - When the data requested requires a multi-disciplinary answer outside the scope of a WFO's expertise.
    - When data needed is historical or documentary in nature and unofficial WFO data is insufficient.